Group Scientific Visit Programme on Advanced Technologies to Strengthen Capabilities of Design, Construction and Operating in Nuclear Power Plants

TENTATIVE AGENDA

Republic of Korea, 27 March – 1 April 2023, Hosted by KHNP				
28 March (Tue.)/Time	Content	Remarks		
09:30-10:30	Opening Ceremony	KHNP head office,		
	Introduction to participants	EVP or VP of KHNP, IAEA		
	Introduction of KHNP and Korean Nuclear			
	Status			
10:30-11:00	Break	Lyun		
11:00-12:30	• Design Features of APR 1400	KHNP		
	Experiences on Barakah Project (UAE)			
12:30-13:30	Lunch	Lynn		
13:30-15:00	Moving to Seoul Site	KHNP		
15;00 – 17:00	• Visiting Seoul 1 &2 (APR-1400)			
1	Visiting Construction site			
Hotel	Busan (One night)			
29 March (Wed.)/Time	Content	Remarks		
08:00-10:00	Moving to Changwon to visit Doosan Enerbility	Doosan Enerbility		
10:00 - 10:30	Presentation on how to manufacture heavy components	Doosan Enerbility		
10:30-12:30	Visiting Factory			
12:30-13:30	Lunch	1		
13:30-17:30	Moving to Daejeon to visit KAERI, NSE and	Sightseeing if time is available		
	KHNP-CRI (CMIS Developing Company using IT)			
	,			
Hotel	Daejeon (Two nights)			
30 March (Thu.) /Time	Content	Remarks		
09:00-12:30	Presentation on Configuration Management using IT, Silkroad	NSE		
	KAERI- Thermal Hydraulic or SMR	KAERI		
12:30-13:30	Lunch			
12:30-17:30	Visiting KHNP-Central Research Institute	KHNP-CRI		
	Digital Twin Technology			
	Virtual Reality Demonstration			
	MMIS Presentation and Demonstration			
	• Core Simulator etc.			
Hotel	Daejeon			
31 March (Fri.) /Time	Content	Remarks		
08:00-10:00	Visiting KEPCO E&C at Gimcheon	KEPCO E&C		
10:00 - 12:30	Advanced Design Tool			
	Building Information Module (BIM)			
	Digital Twin and Computer tool			
	Discussion on the advanced technology to apply newcomers and expanding MSs			
12:30-13:30	Lunch			
13:30-14:30	Internal Meeting to wrap-up the visit	IAEA		
15:00	Move to Seoul			
Hotel	Near Incheon airport			

1 April (Sat) /Time	Content	Remarks
• Flying to Wuhan, the People's Republic of China from Incheon airport		Keep time schedule (stay over a night
		at the same hotel near airport)

The People's Republic of China, 3 – 7 April 2023, Hosted by CNNC			
1 April (Sat.)/Time	Content	Remarks	
	Arrival from Seoul Wuhan and Reception		
2 April (Sun.)/Time	Content	Remarks	
	Reception (Continued)	Wuhan	
3 April (Mon.)/Time	Content	Remarks	
09:00-11:00	 Opening Ceremony Overview of nuclear industry in China Status of Information Technology and its industrial application in China 	Wuhan	
11:00-12:00	Technical meeting The research of SMR in China and the Linglong One design (Digital Reactor) Open discussion	Wuhan	
14:00-17:00	Collaborative 3D design and digital handover for HPR1000 Design V&V for HPR1000 Digital management of nuclear power plant construction and installation Open discussion	Wuhan	
4 April (Tue.)/Time	Content	Remarks	
09:00-10:00	Topical presentation: Challenge and path forward for digital nuclear power plant	Wuhan	
10:00-12:00	Interactive discussion among group visitors and experts from Chinese nuclear industry about problems facing by visitors and potential solutions	Wuhan	
13:00-21:00	Wuhan to Fuqing by plane	Wuhan-Fuqing	
5 April (Wed.) /Time	Content	Remarks	
9:00-12:00	Site visit of HPR1000 unit	Fuqing	
14:00-17:00	Technical meeting: • Planning of digital plant for Fuqing NPP • Status of digital management and implementation for plant operation and maintenance at Fuqing NPP	Fuqing	
	Open discussion		
6 April (Thur.) /Time	Content	Remarks	
	Fuqing to Wuhan by plane	Fuqing-Wuhan	
	Site visit of CNPO facilities • Main Control Room simulator development hall	Wuhan	

	 In-Service Inspection remote data analysis lab Open discussion 	
7 April (Fri.) /Time	Content	Remarks
09:00-12:00	Technical meeting: • The industrial internet platform of NPP (DHP) • NPP operational digital twin • Intelligent management of Severe Accident for Generation III reactor design Open discussion	Wuhan
14:00-16:00	Visit & discussion on: • Engineering prototype of DHP network platform for nuclear industry • Cyber security laboratory of CNNP	
16:00 – 17:00	Wrap-up of the SV	
8 April (Sat.) /Time	Content	Remarks
	Departure	Wuhan – Home Country